

	υ	1	PT	P	Document ID	Issue Dat	Pages	Title	Current OR	Current _
1	r	Г	Г	Γ.	US 20040171269	20040902	130	Substrate processing method	438/694	
2	r	г	г	г	US 20040094328	20040520	61	Cabled signaling system and components thereof	174/251	439/581
3	С	г	г	C	US 20040077117	20040422	26	Feedthrough design and method for a hermetically sealed microdevice	438/51	438/124; 438/126;
4	г	г	г	г	US	20030626		Chamber hardware design for titanium nitride atomic layer deposition	118/715	156/345.
5	r.	Г	r	E:	US 20030092261	20030515	132	Substrate processing method		257/E21. 5;
6	٣	r	r	٣	US 20020041443	20020411	52	Electrochromic mirrors and devices	359/603	359/265; 359/601
7	Г	Г	г	C		20020328		Vacuum IG window unit with edge seal at least partially diffused at temper and completed via microwave curing, and corresponding method	65/34	65/41; 65/43;
8	г	г	٣	r	US 20020020551	20020221	16	CONTROLLED-SHAPED SOLDER RESERVOIRS FOR INCREASING THE VOLUME OF SOLDER BUMPS		174/250; 174/253;
9	г	Г	n	n		20040914		Substrate processing method	438/622	
10	r	r	r	۳	US 6701749 B2	20040309		Vacuum IG window unit with edge seal at least partially diffused at temper and completed via microwave curing, and corresponding method	•	156/104; 156/109;
11	г	Ľ	r	г	US 6557248 B1	20030506	28 ·	Method of fabricating an electrostatic chuck	29/825	361/234
12	г	r	٦	Г	US 6399169 Bl	20020604		Vacuum IG window unit with dual peripheral seal		52/786.1 52/786.1
13	1-	-	_	<u>.</u>	บิริ 6392163	20020521	17	Controlled-shaped solder reservoirs for increasing the volume of	174/261	257/E21. * <u>▶</u>

NUM

L	Hits	Search Text	DB	Time stamp
Number				
1.	1105	substrate and (seal\$4 adj ring) and (gas or liquid) and (open\$4 or hole or trench) and (base or board or plate or body) and	USPAT; US-PGPUB; EPO; JPO;	2004/10/20 11:26
2	1137	conduct\$4 substrate and (seal\$4 adj (mean\$3 or ring)) and (gas or liquid) and (open\$4 or hole or trench) and (base or board or	IBM_TDB USPAT; US-PGPUB; EPO; JPO;	2004/10/20
3	51706	plate or body) and conduct\$4 substrate and (seal\$4 or (seal\$4 adj (mean\$3 or ring))) and (gas or liquid)	IBM_TDB USPAT; US-PGPUB;	2004/10/20
4	103	and (open\$4 or hole or trench) and (base or board or plate or body) and conduct\$4 (substrate and (seal\$4 adj (mean\$3 or ring)) and (gas or liquid) and (open\$4 or hole or trench) and (base or board or	EPO; JPO; IBM_TDB USPAT; US-PGPUB; EPO; JPO;	2004/10/20 11:40
5	1203	plate or body) and conduct\$4) and ((outer or second or inner) adj seal\$4) (substrate and (seal\$4 or (seal\$4 adj (mean\$3 or ring))) and (gas or liquid) and (open\$4 or hole or trench) and (base or board or plate or body) and conduct\$4)	IBM_TDB USPAT; US-PGPUB; EPO; JPO; IBM_TDB	2004/10/20
6	1	and ((outer or second or inner) adj seal\$4) "6579408"	USPAT; US-PGPUB;	2004/10/20 11:35
7	0	6579408.URPN.	EPO; JPO; IBM_TDB USPAT	2004/10/20
8	0	6579408.URPN.	USPAT	2004/10/20
9	4	("5275690" "5324410" "5578167" "6171437").PN.	USPAT	11:36 2004/10/20 11:36
10	4	("5275690" "5437757" "5542559" "5695566").PN.	USPAT	2004/10/20 11:37
11	3	1	USPAT	2004/10/20
12	37	ring)) and (gas or liquid) and (open\$4 or hole or trench) and (base or board or plate or body) and conduct\$4) and ((outer or second or inner) adj seal\$4)) and	USPAT; US-PGPUB; EPO; JPO; IBM_TDB	11:37 2004/10/20 11:43
13	6	(substrate with contact) (US-6746880-\$ or US-6444027-\$ or US-5324410-\$ or US-6579408-\$ or US-6171437-\$).did. or	USPAT; US-PGPUB	2004/10/20 11:40
	36	(US-20040104402-\$).did. (((substrate and (seal\$4 adj (mean\$3 or ring)) and (gas or liquid) and (open\$4 or hole or trench) and (base or board or plate or body) and conduct\$4) and ((outer or second or inner) adj seal\$4)) and (substrate with contact)) not ((US-6746880-\$ or US-6444027-\$ or US-5324410-\$ or US-6579408-\$ or US-6171437-\$).did. or	USPAT; US-PGPUB; EPO; JPO; IBM_TDB	2004/10/20 11:41
15	426	(US-20040104402-\$).did.) (((substrate and (seal\$4 or (seal\$4 adj (mean\$3 or ring))) and (gas or liquid) and (open\$4 or hole or trench) and (base or board or plate or body) and conduct\$4) and ((outer or second or inner) adj seal\$4)) not (((substrate and (seal\$4 adj (mean\$3 or ring)) and (gas or liquid) and (open\$4 or hole or trench) and (base or board or plate or body) and conduct\$4) and ((outer or second or inner) adj seal\$4)) and (substrate with contact))) and (substrate with contact)	USPAT; US-PGPUB; EPO; JPO; IBM_TDB	2004/10/20 11:44

				0004/10/00
16	291	<pre>((((substrate and (seal\$4 or (seal\$4 adj (mean\$3 or ring))) and (gas or liquid) and (open\$4 or hole or trench) and (base or board or plate or body) and conduct\$4) and ((outer or second or inner) adj seal\$4)) not (((substrate and (seal\$4 adj (mean\$3 or ring)) and (gas or liquid) and (open\$4 or hole or trench) and (base or board or plate or body) and conduct\$4) and ((outer or second or inner) adj seal\$4)) and (substrate with contact)))</pre>	USPAT; US-PGPUB; EPO; JPO; IBM_TDB	2004/10/20 11:44
17	121	and (substrate with contact)) and electrode ((((substrate and (seal\$4 or (seal\$4 adj (mean\$3 or ring))) and (gas or liquid) and (open\$4 or hole or trench) and (base or board or plate or body) and conduct\$4) and ((outer or second or inner) adj seal\$4) not (((substrate and (seal\$4 adj (mean\$3 or ring)) and (gas or liquid) and (open\$4 or hole or trench) and (base or	USPAT; US-PGPUB; EPO; JPO; IBM_TDB	2004/10/20 11:45
18	99	board or plate or body) and conduct\$4) and ((outer or second or inner) adj seal\$4)) and (substrate with contact))) and (substrate with contact)) and electrode) and charge ((((((substrate and (seal\$4 or (seal\$4 adj (mean\$3 or ring))) and (gas or liquid) and (open\$4 or hole or trench) and (base or board or plate or body) and conduct\$4) and ((outer or second or inner) adj seal\$4)) not (((substrate and (seal\$4 adj (mean\$3 or ring)) and (gas or	USPAT; US-PGPUB; EPO; JPO; IBM_TDB	2004/10/20 11:45
19	99	liquid) and (open\$4 or hole or trench) and (base or board or plate or body) and conduct\$4) and ((outer or second or inner) adj seal\$4)) and (substrate with contact)) and (substrate with contact)) and electrode) and charge) and current (((((((substrate and (seal\$4 or (seal\$4 adj (mean\$3 or ring))) and (gas or liquid) and (open\$4 or hole or trench) and (base or board or plate or body) and conduct\$4) and ((outer or second or inner) adj seal\$4)) not (((substrate and (seal\$4 adj (mean\$3 or ring))) and (gas or	USPAT; US-PGPUB; EPO; JPO; IBM_TDB	2004/10/20 11:46
20	80	liquid) and (open\$4 or hole or trench) and (base or board or plate or body) and conduct\$4) and ((outer or second or inner) adj seal\$4)) and (substrate with contact)) and (substrate with contact)) and electrode) and charge) and current) and surface (((((((substrate and (seal\$4 or (seal\$4 adj (mean\$3 or ring))) and (gas or liquid) and (open\$4 or hole or trench) and (base or board or plate or body) and conduct\$4) and ((outer or second or inner) adj seal\$4)) not (((substrate and	USPAT; US-PGPUB; EPO; JPO; IBM_TDB	2004/10/20 12:01
		(seal\$4 adj (mean\$3 or ring)) and (gas or liquid) and (open\$4 or hole or trench) and (base or board or plate or body) and conduct\$4) and ((outer or second or inner) adj seal\$4)) and (substrate with contact))) and (substrate with contact)) and electrode) and charge) and current) and surface) and (wir\$4 and (insulat\$4 or dielectric) electrolyt\$3)		

21	67	///////gubatrata and (goal64 an /goal64	I IICDAM.	2004/10/20
21	0/	<pre>((((((((((substrate and (seal\$4 or (seal\$4 adj (mean\$3 or ring))) and (gas or</pre>	USPAT; US-PGPUB;	2004/10/20
		liquid) and (open\$4 or hole or trench)	EPO; JPO;	11:40
		and (base or board or plate or body) and	IBM TDB	
			TEM_IDE	
)		conduct\$4) and ((outer or second or		
		inner) adj seal\$4)) not (((substrate and		
		(seal\$4 adj (mean\$3 or ring)) and (gas or		
		liquid) and (open\$4 or hole or trench)		
		and (base or board or plate or body) and		
	,	conduct\$4) and ((outer or second or		
		inner) adj seal\$4)) and (substrate with		
		contact))) and (substrate with contact))		
		and electrode) and charge) and current)		
		and surface) and (wir\$4 and (insulat\$4 or		
		dielectric) electrolyt\$3)) and etch\$4	*****	2004/10/20
22	66	(((((((((substrate and (seal\$4 or	USPAT;	2004/10/20
		(seal\$4 adj (mean\$3 or ring))) and (gas	US-PGPUB;	11:48
		or liquid) and (open\$4 or hole or trench)	EPO; JPO;	
		and (base or board or plate or body) and	IBM_TDB	
-		conduct\$4) and ((outer or second or		
1		inner) adj seal\$4)) not (((substrate and		
1		(seal\$4 adj (mean\$3 or ring)) and (gas or		
		liquid) and (open\$4 or hole or trench)		
		and (base or board or plate or body) and		
		conduct\$4) and ((outer or second or		
		inner) adj seal\$4)) and (substrate with		
		contact))) and (substrate with contact))		
:		and electrode) and charge) and current)		
		and surface) and (wir\$4 and (insulat\$4 or		
		dielectric) electrolyt\$3)) and etch\$4)		
	67	and method	Habam.	2004/10/20
23	67	((((((((((substrate and (seal\$4 or	USPAT;	2004/10/20
		(seal\$4 adj (mean\$3 or ring))) and (gas	US-PGPUB;	11:51
		or liquid) and (open\$4 or hole or trench)	EPO; JPO;	
		and (base or board or plate or body) and	IBM_TDB	
		conduct\$4) and ((outer or second or		
		inner) adj seal\$4)) not (((substrate and		
		(seal\$4 adj (mean\$3 or ring)) and (gas or liquid) and (open\$4 or hole or trench)		
		and (base or board or plate or body) and		
		conduct\$4) and ((outer or second or		
	1	inner) adj seal\$4)) and (substrate with		
		contact))) and (substrate with contact))		
		and electrode) and charge) and current)		
		and surface) and (wir\$4 and (insulat\$4 or		
		dielectric) electrolyt\$3)) and etch\$4)		
		and (process or method)		
	T .	\ <u>\</u>	į.	

Page 3

24	54	(((((substrate and (seal\$4 or (seal\$4	USPAT;	2004/10/20
		adj (mean\$3 or ring))) and (gas or	US-PGPUB;	11:51
	,	liquid) and (open\$4 or hole or trench)	EPO; JPO;	
		and (base or board or plate or body) and	IBM TDB	
		conduct\$4) and ((outer or second or		
		inner) adj seal\$4)) not (((substrate and		:
	•	(seal\$4 adj (mean\$3 or ring)) and (gas or		
		liquid) and (open\$4 or hole or trench)		
		and (base or board or plate or body) and		
		conduct\$4) and ((outer or second or		
		inner) adj seal\$4)) and (substrate with		
		contact))) and (substrate with contact))		
		and electrode) and charge) not		
		((((((((((substrate and (seal\$4 or		
		(seal\$4 adj (mean\$3 or ring))) and (gas		
		or liquid) and (open\$4 or hole or trench)		
		and (base or board or plate or body) and		
	•	conduct\$4) and ((outer or second or		
		inner) adj seal\$4)) not (((substrate and		
		(seal\$4 adj (mean\$3 or ring)) and (gas or		
		liquid) and (open\$4 or hole or trench)		
		and (base or board or plate or body) and		
		conduct\$4) and ((outer or second or		
		inner) adj seal\$4)) and (substrate with		
		contact))) and (substrate with contact))		
		and electrode) and charge) and current)		
		and surface) and (wir\$4 and (insulat\$4 or		
		dielectric) electrolyt\$3)) and etch\$4)		
_		and (process or method))		
25	9986	substrate and (seal\$4 or (seal\$4 adj	USPAT;	2004/10/20
		(mean\$3 or ring))).clm. and (gas or	US-PGPUB;	12:02
		liquid) and (open\$4 or hole or trench)	EPO; JPO;	
		and (base or board or plate or body) and	IBM_TDB	1
		conduct\$4		0000100
26	103	r · · · · · · · · · · · · · · · · · · ·	USPAT;	2004/10/20
		ring)) and (gas or liquid) and (open\$4 or	US-PGPUB;	12:03
		hole or trench) and (base or board or	EPO; JPO;	
		plate or body) and conduct\$4) and ((outer	IBM_TDB	
		or second or inner) adj seal\$4)) not		
		(((((substrate and (seal\$4 or (seal\$4		
		adj (mean\$3 or ring))) and (gas or		
		liquid) and (open\$4 or hole or trench)		
		and (base or board or plate or body) and		1
		conduct\$4) and ((outer or second or		
		inner) adj seal\$4)) not (((substrate and	İ	1
		(seal\$4 adj (mean\$3 or ring)) and (gas or		
		liquid) and (open\$4 or hole or trench)		}
		and (base or board or plate or body) and		
		conduct\$4) and ((outer or second or		
		inner) adj seal\$4)) and (substrate with		
		contact))) and (substrate with contact))		
		and electrode) and charge)		

			Linna	0004/20/20
27 .	66	(((substrate and (seal\$4 adj (mean\$3 or ring)) and (gas or liquid) and (open\$4 or	USPAT; US-PGPUB;	2004/10/20 12:07
ļ		hole or trench) and (base or board or	EPO; JPO;	12.07
		plate or body) and conduct\$4) and ((outer	IBM TDB	
		or second or inner) adj seal\$4)) not	_	
		(((((substrate and (seal\$4 or (seal\$4		
		adj (mean\$3 or ring))) and (gas or		
		liquid) and (open\$4 or hole or trench)		
	· ·	and (base or board or plate or body) and		
		conduct\$4) and ((outer or second or		
		inner) adj seal\$4)) not (((substrate and		
		(seal\$4 adj (mean\$3 or ring)) and (gas or liquid) and (open\$4 or hole or trench)		
		and (base or board or plate or body) and		
		conduct\$4) and ((outer or second or		
		inner) adj seal\$4)) and (substrate with		
		contact))) and (substrate with contact))		
		and electrode) and charge)) not		
	1	((((substrate and (seal\$4 adj (mean\$3 or		
		ring)) and (gas or liquid) and (open\$4 or		
		hole or trench) and (base or board or		
ĺ		plate or body) and conduct\$4) and ((outer		
ļ		or second or inner) adj seal\$4)) and		
		(substrate with contact)) ((US-6746880-\$		
		or US-6444027-\$ or US-5324410-\$ or US-6579408-\$ or US-6171437-\$).did. or		
		(US-20040104402-\$).did.) (((substrate		
		and (seal\$4 adj (mean\$3 or ring)) and		
		(gas or liquid) and (open\$4 or hole or		
		trench) and (base or board or plate or		
		body) and conduct\$4) and ((outer or		
		second or inner) adj seal\$4)) and		
		(substrate with contact)) not		
		((US-6746880-\$ or US-6444027-\$ or		
	-	US-5324410-\$ or US-6579408-\$ or		
		US-6171437-\$).did. or (US-20040104402-\$).did.)))		
28	9910	1	USPAT;	2004/10/20
20	3310	(mean\$3 or ring))).clm. and (gas or	US-PGPUB;	12:07
		liquid) and (open\$4 or hole or trench)	EPO; JPO;	
		and (base or board or plate or body) and	IBM_TDB	
		conduct\$4) not (((substrate and (seal\$4	_	•
		adj (mean\$3 or ring)) and (gas or liquid)		
		and (open\$4 or hole or trench) and (base		
		or board or plate or body) and conduct\$4)		
		and ((outer or second or inner) adj		
		seal\$4)) not (((((substrate and (seal\$4) or (seal\$4 adj (mean\$3 or ring))) and		
		(gas or liquid) and (open\$4 or hole or		
		trench) and (base or board or plate or		
		body) and conduct\$4) and ((outer or		
		second or inner) adj seal\$4)) not		
		(((substrate and (seal\$4 adj (mean\$3 or		
		ring)) and (gas or liquid) and (open\$4 or		
1		hole or trench) and (base or board or		
		plate or body) and conduct\$4) and ((outer		
		or second or inner) adj seal\$4)) and		
		(substrate with contact))) and (substrate with contact)) and electrode) and		
1		charge))		
L	1		L	L

29	1067		USPAT;	2004/10/20
		(mean\$3 or ring))).clm. and (gas or	US-PGPUB;	12:08
		liquid) and (open\$4 or hole or trench)	EPO; JPO;	
		and (base or board or plate or body) and	IBM_TDB	
		conduct\$4) not (((substrate and (seal\$4		
		adj (mean\$3 or ring)) and (gas or liquid)		
		and (open\$4 or hole or trench) and (base		
		or board or plate or body) and conduct\$4)		
		and ((outer or second or inner) adj		
		seal\$4)) not (((((substrate and (seal\$4		
		or (seal\$4 adj (mean\$3 or ring))) and		
		(gas or liquid) and (open\$4 or hole or		
		trench) and (base or board or plate or		
		body) and conduct\$4) and ((outer or	0)	
		second or inner) adj seal\$4)) not	ļ	
		(((substrate and (seal\$4 adj (mean\$3 or	Ì	
		, , ,		
		ring)) and (gas or liquid) and (open\$4 or		
		hole or trench) and (base or board or		*
		plate or body) and conduct\$4) and ((outer		
		or second or inner) adj seal\$4)) and		1
		(substrate with contact))) and (substrate		
		with contact)) and electrode) and		
		charge))) and (seal\$4.ab. and (substrate		
		and (body or base or board or		
		plate).ab.))		2004/12/22
30	333	((substrate and (seal\$4 or (seal\$4 adj	USPAT;	2004/10/20
ì		(mean\$3 or ring))).clm. and (gas or	US-PGPUB;	12:08
		liquid) and (open\$4 or hole or trench)	EPO; JPO;	
1	,	and (base or board or plate or body) and	IBM_TDB	
		conduct\$4) not (((substrate and (seal\$4		
		adj (mean\$3 or ring)) and (gas or liquid)		
	i	and (open\$4 or hole or trench) and (base		
	<u>.</u>	or board or plate or body) and conduct\$4)		
		and ((outer or second or inner) adj		
		and ((outer or second or inner) adj seal\$4)) not (((((substrate and (seal\$4)		
		<pre>and ((outer or second or inner) adj seal\$4)) not (((((substrate and (seal\$4 or (seal\$4 adj (mean\$3 or ring))) and</pre>		
		and ((outer or second or inner) adj seal\$4)) not (((((substrate and (seal\$4 or (seal\$4 adj (mean\$3 or ring))) and (gas or liquid) and (open\$4 or hole or		
		and ((outer or second or inner) adj seal\$4)) not (((((substrate and (seal\$4 or (seal\$4 adj (mean\$3 or ring))) and (gas or liquid) and (open\$4 or hole or trench) and (base or board or plate or		
		and ((outer or second or inner) adj seal\$4)) not (((((substrate and (seal\$4 or (seal\$4 adj (mean\$3 or ring))) and (gas or liquid) and (open\$4 or hole or trench) and (base or board or plate or body) and conduct\$4) and ((outer or		
		and ((outer or second or inner) adj seal\$4)) not (((((substrate and (seal\$4 or (seal\$4 adj (mean\$3 or ring))) and (gas or liquid) and (open\$4 or hole or trench) and (base or board or plate or body) and conduct\$4) and ((outer or second or inner) adj seal\$4)) not		
		and ((outer or second or inner) adj seal\$4)) not (((((substrate and (seal\$4 or (seal\$4 adj (mean\$3 or ring))) and (gas or liquid) and (open\$4 or hole or trench) and (base or board or plate or body) and conduct\$4) and ((outer or second or inner) adj seal\$4)) not (((substrate and (seal\$4 adj (mean\$3 or		
		and ((outer or second or inner) adj seal\$4)) not (((((substrate and (seal\$4 or (seal\$4 adj (mean\$3 or ring))) and (gas or liquid) and (open\$4 or hole or trench) and (base or board or plate or body) and conduct\$4) and ((outer or second or inner) adj seal\$4)) not (((substrate and (seal\$4 adj (mean\$3 or ring)) and (gas or liquid) and (open\$4 or		
		and ((outer or second or inner) adj seal\$4)) not ((((((substrate and (seal\$4 or (seal\$4 adj (mean\$3 or ring))) and (gas or liquid) and (open\$4 or hole or trench) and (base or board or plate or body) and conduct\$4) and ((outer or second or inner) adj seal\$4)) not (((substrate and (seal\$4 adj (mean\$3 or ring)) and (gas or liquid) and (open\$4 or hole or trench) and (base or board or		
		and ((outer or second or inner) adj seal\$4)) not ((((((substrate and (seal\$4 or (seal\$4 adj (mean\$3 or ring))) and (gas or liquid) and (open\$4 or hole or trench) and (base or board or plate or body) and conduct\$4) and ((outer or second or inner) adj seal\$4)) not (((substrate and (seal\$4 adj (mean\$3 or ring)) and (gas or liquid) and (open\$4 or hole or trench) and (base or board or plate or body) and conduct\$4) and ((outer		
		and ((outer or second or inner) adj seal\$4)) not ((((((substrate and (seal\$4 or (seal\$4 adj (mean\$3 or ring))) and (gas or liquid) and (open\$4 or hole or trench) and (base or board or plate or body) and conduct\$4) and ((outer or second or inner) adj seal\$4)) not (((substrate and (seal\$4 adj (mean\$3 or ring)) and (gas or liquid) and (open\$4 or hole or trench) and (base or board or plate or body) and conduct\$4) and ((outer or second or inner) adj seal\$4)) and		
		and ((outer or second or inner) adj seal\$4)) not ((((((substrate and (seal\$4 or (seal\$4 adj (mean\$3 or ring))) and (gas or liquid) and (open\$4 or hole or trench) and (base or board or plate or body) and conduct\$4) and ((outer or second or inner) adj seal\$4)) not (((substrate and (seal\$4 adj (mean\$3 or ring)) and (gas or liquid) and (open\$4 or hole or trench) and (base or board or plate or body) and conduct\$4) and ((outer		
		and ((outer or second or inner) adj seal\$4)) not ((((((substrate and (seal\$4 or (seal\$4 adj (mean\$3 or ring))) and (gas or liquid) and (open\$4 or hole or trench) and (base or board or plate or body) and conduct\$4) and ((outer or second or inner) adj seal\$4)) not (((substrate and (seal\$4 adj (mean\$3 or ring)) and (gas or liquid) and (open\$4 or hole or trench) and (base or board or plate or body) and conduct\$4) and ((outer or second or inner) adj seal\$4)) and		
		and ((outer or second or inner) adj seal\$4)) not ((((((substrate and (seal\$4 or (seal\$4 adj (mean\$3 or ring))) and (gas or liquid) and (open\$4 or hole or trench) and (base or board or plate or body) and conduct\$4) and ((outer or second or inner) adj seal\$4)) not (((substrate and (seal\$4 adj (mean\$3 or ring)) and (gas or liquid) and (open\$4 or hole or trench) and (base or board or plate or body) and conduct\$4) and ((outer or second or inner) adj seal\$4)) and (substrate with contact))) and (substrate		
		and ((outer or second or inner) adj seal\$4)) not ((((((substrate and (seal\$4 or (seal\$4 adj (mean\$3 or ring))) and (gas or liquid) and (open\$4 or hole or trench) and (base or board or plate or body) and conduct\$4) and ((outer or second or inner) adj seal\$4)) not (((substrate and (seal\$4 adj (mean\$3 or ring)) and (gas or liquid) and (open\$4 or hole or trench) and (base or board or plate or body) and conduct\$4) and ((outer or second or inner) adj seal\$4)) and (substrate with contact))) and (substrate with contact)) and electrode) and		

				0004/10/00
31	196	(((substrate and (seal\$4 or (seal\$4 adj (mean\$3 or ring))).clm. and (gas or	USPAT; US-PGPUB;	2004/10/20 12:09
		liquid) and (open\$4 or hole or trench)	EPO; JPO;	14.09
		and (base or board or plate or body) and	IBM TDB	
		conduct\$4) not (((substrate and (seal\$4	_	
		adj (mean\$3 or ring)) and (gas or liquid)		
		and (open\$4 or hole or trench) and (base		
		or board or plate or body) and conduct\$4)		
		and ((outer or second or inner) adj		
		seal\$4)) not (((((substrate and (seal\$4		
		or (seal\$4 adj (mean\$3 or ring))) and		
		(gas or liquid) and (open\$4 or hole or		
		trench) and (base or board or plate or body) and conduct\$4) and ((outer or		
		second or inner) adj seal\$4)) not		
İ		(((substrate and (seal\$4 adj (mean\$3 or		
		ring)) and (gas or liquid) and (open\$4 or		
		hole or trench) and (base or board or		
		plate or body) and conduct\$4) and ((outer		
		or second or inner) adj seal\$4)) and		
		(substrate with contact))) and (substrate		
		with contact)) and electrode) and		
		charge))) and (seal\$4.ab. and (substrate and (body or base or board or		
		plate)).ab.)) and electrode		
32	85	(((substrate and (seal\$4 or (seal\$4 adj	USPAT;	2004/10/20
		(mean\$3 or ring))).clm. and (gas or	US-PGPUB;	12:09
		liquid) and (open\$4 or hole or trench)	EPO; JPO;	
		and (base or board or plate or body) and	IBM_TDB	
		conduct\$4) not (((substrate and (seal\$4		
		adj (mean\$3 or ring)) and (gas or liquid)		
		and (open\$4 or hole or trench) and (base		
		or board or plate or body) and conduct\$4) and ((outer or second or inner) adj		•
		seal\$4)) not (((((substrate and (seal\$4)	i.	
		or (seal\$4 adj (mean\$3 or ring))) and		
		(gas or liquid) and (open\$4 or hole or		
		trench) and (base or board or plate or		
		body) and conduct\$4) and ((outer or		
		second or inner) adj seal\$4)) not		
		(((substrate and (seal\$4 adj (mean\$3 or ring)) and (gas or liquid) and (open\$4 or		
		hole or trench) and (base or board or		
		plate or body) and conduct\$4) and ((outer		
		or second or inner) adj seal\$4)) and		
		(substrate with contact))) and (substrate		
		with contact)) and electrode) and		
		charge))) and (seal\$4.ab. and (substrate		
		and (body or base or board or plate)).ab.)) and electrode.ab.		
_	34	• · · · · · · · · · · · · · · · · · ·	USPAT;	2004/10/20
			US-PGPUB;	11:22
			EPO; JPO;	
			IBM_TDB	
-	71	franosch-martin.in.	USPAT;	2004/10/19
			US-PGPUB;	19:07
ļ			EPO; JPO; IBM TDB	
_	57	goldbach-matthias.in.	USPAT;	2004/10/19
_] 3/	gordbach-macchras. III.	US-PGPUB;	19:07
			EPO; JPO;	=
			IBM_TDB	
-	150	lehmann-volker.in.	USPĀT;	2004/10/19
	1		US-PGPUB;	19:08
	1		EPO; JPO;	
	1	lutaen jam in	IBM_TDB USPAT;	2004/10/19
_	16	lutzen-jorn.in.	US-PGPUB;	19:08
			EPO; JPO;	
			IBM_TDB	

			0004/10/10
262		·	2004/10/19
	goldbach-matthias.in. lehmann-volker.in.		19:08
	lutzen-jorn.in.	EPO; JPO;	
		IBM_TDB	
3	(birner-albert.in. franosch-martin.in.	USPAT;	2004/10/19
	goldbach-matthias.in. lehmann-volker.in.	US-PGPUB;	19:17
		EPO; JPO;	
	and substrate and (board or base or	IBM TDB	
	plate) and (hole or open\$4) and conduct\$4	_	i
9		USPAT	2004/10/19
	"5437777" "5463526" "5511428"		19:11
	"5911461" "6217724" "6444027").PN.		
15		USPAT	2004/10/19
			19:14
4		PNSPAT:	2004/10/19
_	(507,1010 62,0000 602,1120 612,000 / 6		19:17
	-		
3	("4043894" "4696729" "5126031").PN.	_	2004/10/19
	1010021 1050.25 0210002		19:18
12	5324410 URPN	USPAT	2004/10/19
12	3324110.0MIN.		19:18
	9	goldbach-matthias.in. lehmann-volker.in. lutzen-jorn.in. (birner-albert.in. franosch-martin.in. goldbach-matthias.in. lehmann-volker.in. lutzen-jorn.in.) and (seal\$4 adj ring) and substrate and (board or base or plate) and (hole or open\$4) and conduct\$4 ("4428815" "4876224" "5209833" "543777" "5463526" "5511428" "5911461" "6217724" "6444027").PN. ("4322592" "4496609" "5192371" "5200157" "5242501" "5516367" "5679405" "5769942" "5856240" "5904769" "5960555" "6103014" "6127286" "6129047" "6184154").PN. ("5071510" "5209833" "5324410" "6120657").	goldbach-matthias.in. lehmann-volker.in. lutzen-jorn.in. 3 (birner-albert.in. franosch-martin.in. goldbach-matthias.in. lehmann-volker.in. lutzen-jorn.in.) and (seal\$4 adj ring) and substrate and (board or base or plate) and (hole or open\$4) and conduct\$4 ("4428815" "4876224" "5209833" "5911461" "6217724" "6444027").PN. ("4322592" "4496609" "55192371" "57679405" "5769942" "5516367" "5500157" "5242501" "5516367" "579405" "5769942" "5856240" "5904769" "5960555" "6103014" "6127286" "6129047" "6184154").PN. ("5071510" "5209833" "5324410" "6120657"). PNSPAT; US-PGPUB; EPO; JPO; IBM_TDB ("4043894" "4696729" "5126031").PN.